

Amendments to the Claims:

This listing of claims will replace all prior versions, and listings, of claims in the application:

Claim 1 (currently amended) A drill insert comprising:

a drill insert body having a first end opposite a second end, a first face side opposite and parallel to a second face side, and a first land side opposite a second land side, the first and second land sides formed between the ends and the face sides;

wherein the second end of the drill body comprises at least two main cutting edges formed transverse to each other, wherein at least a portion of each cutting edge of the two main cutting edges is curved; and

at least two grooves formed transverse to each other, each of the at least two grooves formed in one of the face sides adjacent to the second end of the drill body and intersecting the second end of the drill body to form one of the main cutting edges, each formed in each cutting face adjacent the cutting edge, the groove having a trough, wherein at least a portion of the trough is curved substantially parallel to a plane formed through the adjacent curved cutting edge.

Claim 2 (original) The drill insert of claim 1, wherein the cutting edges have a positive radial rake angle.

Claim 3 (original) The drill insert of claim 1, wherein the cutting edges have a positive axial rake angle.

Claim 4 (original) The drill insert of claim 1, wherein the cutting edges have a cutting edge treatment.

Claim 5 (canceled)

Claim 6 (canceled)

Claim 7 (original) The drill insert of claim 1, wherein the cutting edges have a cutting edge treatment applied thereto selected from the group consisting of a K-land, a T-land, and a hone.

Claim 8 (original) The drill insert of claim 1, wherein at least a portion of each curved cutting edge extends beyond the plane of the corresponding face side of the drill insert body.

Claim 9 (original) The drill insert of claim 1, wherein each land has a margin formed with a constant arcuate width between the leading side and the trailing side such that both the leading side and the trailing side are formed as a helix.

Claim 10 (original) The drill insert of claim 1, wherein each land has a margin and the leading side of each margin is formed as a helix and wherein a helical flute is formed adjacent the leading side of each margin.

Claim 11 (original) The drill insert of claim 10, wherein at least two apertures are formed through each face side of the drill insert body, and
wherein the helical flutes are formed radially outward of the apertures.

Claim 12 (currently amended) The drill insert of claim 11[[1]], wherein the helical flutes intersect with the groove on each face side of the drill body.

Claim 13 (currently amended) The drill insert of claim 1, wherein the first end of the drill insert body is a generally planar surface having at least one recess formed therein.

Claim 14 (original) The drill insert of claim 1 further comprises a chip breaker formed through each cutting edge.

Claim 15 (original) The drill insert of claim 1, wherein the drill insert body is comprised of a sintered metallic hard material.

Claim 16 (original) The drill insert of claim 1, wherein the drill insert body is comprised of a material selected from the group consisting of carbide, cermet, ceramic, monocrystalline and polycrystalline diamond, and boron nitride.

Claim 17 (original) The drill insert of claim 1, wherein the drill insert body is comprised of high speed steel.

Claim 18 (currently amended) A drill insert comprising:

a drill insert body having a first end opposite a second end, a first face side opposite and parallel to a second face side, and a first land side opposite a second land side, the first and second land sides formed between the ends and the face sides;

~~wherein the first end of the drill body is a generally planar surface having at least one recess formed in the first end;~~

wherein the second end comprises at least two cutting edges formed transverse to each other and wherein at least a portion of each cutting edge is curved;

~~at least two apertures formed through each face side of the drill insert body; and~~

a groove formed in each face side of the drill insert body adjacent the cutting edge, the groove having a trough, wherein at least a portion of the trough is curved and a plane formed through the trough is substantially parallel to a plane formed through the adjacent curved cutting edge.

Claim 19 (original) The drill insert of claim 18, wherein the cutting edges have a positive radial rake angle and a positive axial rake angle.

Claim 20 (original) The drill insert of claim 18, wherein each land has a margin wherein the leading side of each margin is formed as a helix and a helical flute is formed adjacent the leading side of each margin.

Claim 21 (original) The drill insert of claim 20, wherein the helical flutes are formed radially outward of the apertures.

Claim 22 (original) The drill insert of claim 20, wherein the helical flutes intersect with the groove on each face side of the drill body.

Claim 23 (original) The drill insert of claim 18, wherein at least a portion of each curved cutting edge extends beyond a plane extending from the corresponding face side of the drill insert body.

Claim 24 (currently amended) A drilling tool assembly comprising:

a holder having a first end and a second end, wherein the second end comprises a shank portion adapted to be fixedly attached in a drilling machine, wherein the first end comprises a holder slot having a bottom seating surface over at least a portion of the holder slot and at least one attachment arm positioned on each side of the holder slot, wherein each attachment arm has at least one aperture formed therein; and

a drill insert comprising a drill insert body having a first end opposite a second end, a first face side opposite a second face side and a first land side opposite a second land side, the first and second land sides formed between the ends and the face sides, wherein the first end of the drill body is a generally planar surface, wherein the second end of the drill insert comprises at least two main cutting edges formed transverse to each other, wherein at least a portion of each of the at least two main cutting edges is curved, at least two apertures formed through each face side of the drill insert body, and at least two grooves formed transverse to each other, each of the at least two grooves formed in one of the face sides adjacent to the second end of the drill insert body and intersecting the second end of the drill insert body to form one of the main cutting edges, each groove formed in each face side of the drill insert body adjacent the cutting edge, the groove having a trough, wherein at least a portion of the trough is curved substantially parallel to a plane formed through the adjacent curved cutting edge.

Claim 25 (currently amended) The drilling tool assembly of claim 24, wherein each land side of the drill insert body includes a margin having a leading side of the margin and a trailing side of

the margin, wherein the leading side of each margin is formed as a helix and a helical flute is formed adjacent the leading side of each margin.

Claim 26 (original) The drilling tool assembly of claim 25, wherein the helical flutes are formed radially outward of the apertures.

Claim 27 (original) The drilling tool assembly of claim 24, wherein the holder slot includes a locating boss extending from the bottom seating surface and the first end of the drill insert body has at least one recess which cooperates with the locating boss of the bottom seating surface to allow the insert to be seated against the bottom seating surface.

Claim 28 (original) The drilling tool assembly of claim 24, wherein the holder includes at least one flushing channel.

Claim 29 (original) The drilling tool assembly according to claim 24, wherein a fastening mechanism engages each aperture of the at least two apertures of the drill insert and a corresponding aperture of the at least one aperture in each clamp arm for securing the drill insert in position within the holder slot.

Claim 30 (original) The drilling tool assembly according to claim 29, wherein the at least one aperture in each clamp arm is offset from the corresponding aperture in the drill insert at least to urge the drill insert against the bottom seating surface of said holder slot.